	Type	L #	Hits	Search Text	DBs	Time Stamp	Comments	Error Defin...	Errors
1	BRS	L1	1047	antimicrobial adj peptide	USPAT; US-PGPUB; EPO; JPO; DERWENT	2003/07/16 17:56			0
2	BRS	L2	0	platelet adj microbicidal adj protein	USPAT; US-PGPUB; EPO; JPO; DERWENT	2003/07/16 17:57			0
3	BRS	L3	1	platelet adj microbial adj protein	USPAT; US-PGPUB; EPO; JPO; DERWENT	2003/07/16 17:57			0
4	BRS	L4	0	(antimicrobial adj peptide) same (platelet adj microbial adj protein)	USPAT; US-PGPUB; EPO; JPO; DERWENT	2003/07/16 17:58			0
5	BRS	L5	2	yeaman adj michael.in.	USPAT; US-PGPUB; EPO; JPO; DERWENT	2003/07/16 17:58			0
6	BRS	L6	3	shen adj alexander.in.	USPAT; US-PGPUB; EPO; JPO; DERWENT	2003/07/16 17:58			0
7	BRS	L7	1792	pmp	USPAT; US-PGPUB; EPO; JPO; DERWENT	2003/07/16 17:58			0
8	BRS	L8	0	(antimicrobial adj peptide) same pmp	USPAT; US-PGPUB; EPO; JPO; DERWENT	2003/07/16 17:58			0

FILE 'MEDLINE' ENTERED AT 18:02 ON 16 JUL 2003

FILE 'CAPLUS' ENTERED AT 18:02:05 ON 16 JUL 2003
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FILE 'AGRICOLA' ENTERED AT 18:02:05 ON 16 JUL 2003

=> s antimicrobial peptide
L1 8935 ANTIMICROBIAL PEPTIDE

=> s platelet microbicidal protein
L2 253 PLATELET MICROBICIDAL PROTEIN

=> s platelet microbial protein
L3 7 PLATELET MICROBIAL PROTEIN

=> s L1 (p) (l2 or l3)
L4 57 L1 (P) (L2 OR L3)

=> duplicate remove l4
DUPLICATE PREFERENCE IS 'MEDLINE, CAPLUS, BIOSIS, EMBASE, SCISEARCH'
KEEP DUPLICATES FROM MORE THAN ONE FILE? Y/(N):n
PROCESSING COMPLETED FOR L4
L5 18 DUPLICATE REMOVE L4 (39 DUPLICATES REMOVED)

=> d l5 1-4 ibib abs

L5 ANSWER 1 OF 18 SCISEARCH COPYRIGHT 2003 THOMSON ISI
ACCESSION NUMBER: 2003:539128 SCISEARCH
THE GENUINE ARTICLE: 691TM
TITLE: Arming the enemy: the evolution of resistance to self-proteins
AUTHOR: Bell G (Reprint); Gouyon P H
CORPORATE SOURCE: McGill Univ, Dept Biol, 1205 Doctor Penfield Ave, Montreal, PQ H3A 1B1, Canada (Reprint); McGill Univ, Dept Biol, Montreal, PQ H3A 1B1, Canada; Univ Paris 11, Lab Ecol Syst & Evolut, F-91405 Orsay, France
COUNTRY OF AUTHOR: Canada; France
SOURCE: MICROBIOLOGY-SGM, (JUN 2003) Vol. 149, Part 6, pp. 1367-1375.
Publisher: SOC GENERAL MICROBIOLOGY, MARLBOROUGH HOUSE, BASINGSTOKE RD, SPENCERS WOODS, READING RG7 1AG, BERKS, ENGLAND.
ISSN: 1350-0872.
DOCUMENT TYPE: General Review; Journal
LANGUAGE: English
REFERENCE COUNT: 35
ABSTRACT IS AVAILABLE IN THE ALL AND IALL FORMATS
AB A remarkable range of novel antibiotics is attracting increasing interest as a major new weapon in the campaign against bacterial infection. They are based on the toxic peptides that provide the innate immune system of animals, and it is claimed that bacteria will be unable to evolve resistance to them because they attack the 'Achilles' heel' of bacterial membrane structure. Both experimental evidence and theoretical arguments suggest that this claim is doubtful. If so, the introduction of these substances into general use may provoke the evolution of resistance to our own defence proteins and thus compromise our natural defences against infection.

L5 ANSWER 2 OF 18 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:539709 CAPLUS
DOCUMENT NUMBER: 137:88438
TITLE: ***Antimicrobial*** ***peptides*** and derived metapeptides based on modeling of the microbicidal domain of ***platelet*** ***microbicidal***

proteins (PMPs)
INVENTOR(S): Yeaman[redacted]ichael R.; Shen, Alexander J.[redacted]
PATENT ASSIGNEE(S): Harbor-UCLA Research and Education Institute, USA
SOURCE: PCT Int. Appl., 160 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002055554	A2	20020718	WO 2001-US41877	20010824

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2000-648816 A 20000825
OTHER SOURCE(S): MARPAT 137:88438

AB The invention relates to designing antimicrobial peptides basing on the three-dimensional structures of the microbicidal domain of PMP-1 and PMP-2. The peptides and deriv. metapeptides based upon natural antimicrobial peptides have potent and broad spectrum activity against pathogens exhibiting multiple antibiotic resistance. Specific peptides can also potentiate the antimicrobial functions of leukocytes, such as neutrophils. In addn., they exhibit lower inherent mammalian cell toxicities than conventional antimicrobial peptides, and overcome problems of toxicity, immunogenicity, and shortness of duration of effectiveness due to biodegrdn., retaining activity in plasma and serum. The peptides and deriv. metapeptides exhibit rapid microbicidal activities in vitro, can be used to potentiate conventional antimicrobial agents, to potentiate other antimicrobial peptides, and are active against many organisms that exhibit resistance to multiple antibiotics currently in existence.

L5 ANSWER 3 OF 18 MEDLINE DUPLICATE 1
ACCESSION NUMBER: 2002700354 MEDLINE
DOCUMENT NUMBER: 22322713 PubMed ID: 12435692
TITLE: Synthetic peptides that exert antimicrobial activities in whole blood and blood-derived matrices.
AUTHOR: Yeaman Michael R; Gank Kimberly D; Bayer Arnold S; Brass Eric P
CORPORATE SOURCE: Department of Medicine, Division of Infectious Diseases, Harbor-UCLA Medical Center, Research and Education Institute at Harbor-UCLA, Torrance, California 90502, USA.. mryeaman@ucla.edu
CONTRACT NUMBER: AI39108 (NIAID)
AI48031 (NIAID)
RR14857 (NCRR)
SOURCE: ANTIMICROBIAL AGENTS AND CHEMOTHERAPY, (2002 Dec) 46 (12) 3883-91.
Journal code: 0315061. ISSN: 0066-4804.
PUB. COUNTRY: United States
DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)
LANGUAGE: English
FILE SEGMENT: Priority Journals
ENTRY MONTH: 200305
ENTRY DATE: Entered STN: 20021217
Last Updated on STN: 20030502
Entered Medline: 20030501

AB Peptides that exert antimicrobial activity in artificial media may lack activity within blood or other complex biological matrices. To facilitate the evaluation of ***antimicrobial*** ***peptides*** for possible therapeutic utility, an ex vivo assay was developed to assess the extent and durability of peptide antimicrobial activities in complex fluid biomatrices of whole blood, plasma, and serum compared with those in conventional media. Novel ***antimicrobial*** ***peptides*** (RP-1 and RP-11) were designed based in part on ***platelet*** ***microbicidal*** ***proteins*** . RP-1, RP-11, or gentamicin was introduced into biomatrices either coincident with, or 2 h prior to, inoculation with an Escherichia coli target organism. Antimicrobial activities of peptides were assessed by quantitative culture 2 h after bacterial inoculation and compared to those of peptide-free and gentamicin

controls. In whole blood and homologous plasma or serum, introduction of RP-1 or RP-11 coincident with E. coli was associated with a significant reduction in CFU per milliliter versus the respective peptide-free controls. Moreover, substantial antimicrobial activity remained when RP-1 or RP-11 was placed into whole blood or plasma 2 h prior to E. coli inoculation. These results suggest that the peptides were not rapidly inactivated within these biomatrices. Peptide antimicrobial activities were negatively affected by preincubation in serum or in heat-inactivated serum, compared with those of the respective controls. Peptides RP-1 and RP-11 were consistently effective at lower concentrations in biomatrices than in artificial media, indicating favorable antimicrobial interactions with components of blood or blood fractions. Collectively, these findings support the concept that synthetic peptides can be designed to exert potent antimicrobial activities in relevant and complex biological matrices.

L5 ANSWER 4 OF 18 MEDLINE DUPLICATE 2
ACCESSION NUMBER: 2002109765 MEDLINE
DOCUMENT NUMBER: 21828614 PubMed ID: 11839632
TITLE: In vitro susceptibility to thrombin-induced platelet microbicidal protein is associated with reduced disease progression and complication rates in experimental Staphylococcus aureus endocarditis: microbiological, histopathologic, and echocardiographic analyses.
AUTHOR: Kupferwasser Leon Iri; Yeaman Michael R; Shapiro Shelley M; Nast Cynthia C; Bayer Arnold S
CORPORATE SOURCE: Division of Infectious Diseases, St John's Cardiovascular Research Center and the Research & Education Institute, Torrance, Calif 90502, USA.. kupferwasser@hotmail.com
CONTRACT NUMBER: AI39001 (NIAID)
AI39108 (NIAID)
AI48031 (NIAID)
SOURCE: CIRCULATION, (2002 Feb 12) 105 (6) 746-52.
Journal code: 0147763. ISSN: 1524-4539.
PUB. COUNTRY: United States
DOCUMENT TYPE: Journal; Article; (JOURNAL ARTICLE)
LANGUAGE: English
FILE SEGMENT: Abridged Index Medicus Journals; Priority Journals
ENTRY MONTH: 200202
ENTRY DATE: Entered STN: 20020214
Last Updated on STN: 20020223
Entered Medline: 20020222

AB BACKGROUND: Mammalian platelets contain small, cationic, staphylocidal peptides, termed thrombin-induced ***platelet*** - ***microbicidal*** ***proteins*** (tPMPs). Evidence suggests that tPMPs play a key role in host defense against endovascular infections, such as infective endocarditis (IE). In the present study, we evaluated the influence of differences in staphylococcal tPMP-susceptibility profiles in vitro on disease severity in experimental IE. METHODS AND RESULTS: Experimental IE was induced in rabbits with either a tPMP-susceptible or an isogenic tPMP-resistant Staphylococcus aureus strain. Vegetation size, left ventricular fractional shortening, and onset of aortic valvular regurgitation were serially assessed by echocardiography over an 11-day postinfection period. In addition, blood cultures were performed daily. Parameters delineated at autopsy included vegetation weights; bacterial densities in vegetations, myocardium, and kidneys; extent of valvular and perivalvular tissue damage; and renal embolization. The following significant differences were observed in animals infected with the tPMP-susceptible versus the tPMP-resistant S aureus strain: substantially lower bacteremia rates (P=0.02); reduced vegetation growth (P<0.001) and weight (P<0.001); a later onset of aortic valvular regurgitation (P=0.0039); increased preservation of left ventricular function (P<0.001); reduced valvular tissue damage (P=0.01) and perivalvular inflammation (P=0.015); and reduced bacterial densities in vegetations (P<0.001) and kidneys (P<0.01). CONCLUSIONS: The in vitro tPMP-susceptibility profile in S aureus substantially affects a number of well-defined cardiac and microbiological parameters related to disease severity and prognosis in IE. These findings underscore the likelihood that platelets mitigate the pathogenesis of endovascular infections via local secretion of ***antimicrobial*** ***peptides*** .

=> s pmp
L6 4935 PMP

=> s l6 (p) l1
L7 12 L6 (P) L1

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=> duplicat remove l7
DUPLICATE PREFERENCE IS 'MEDLINE, CAPLUS, BIOSIS, EMBASE, SCISEARCH'
KEEP DUPLICATES FROM MORE THAN ONE FILE?  Y/(N):n
PROCESSING COMPLETED FOR L7
L8             4 DUPLICATE REMOVE L7 (8 DUPLICATES REMOVED)

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     (FILE 'HOME' ENTERED AT 18:01:41 ON 16 JUL 2003)

     FILE 'MEDLINE, CAPLUS, BIOSIS, EMBASE, SCISEARCH, AGRICOLA' ENTERED AT
     18:02:05 ON 16 JUL 2003
L1          8935 S ANTIMICROBIAL PEPTIDE
L2           253 S PLATELET MICROBICIDAL PROTEIN
L3             7 S PLATELET MICROBIAL PROTEIN
L4            57 S L1 (P) (L2 OR L3)
L5            18 DUPLICATE REMOVE L4 (39 DUPLICATES REMOVED)
L6          4935 S PMP
L7            12 S L6 (P) L1
L8             4 DUPLICATE REMOVE L7 (8 DUPLICATES REMOVED)

=> s l8 not l5
L9             0 L8 NOT L5

=> d his

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     FILE 'MEDLINE, CAPLUS, BIOSIS, EMBASE, SCISEARCH, AGRICOLA' ENTERED AT
     18:02:05 ON 16 JUL 2003
L1          8935 S ANTIMICROBIAL PEPTIDE
L2           253 S PLATELET MICROBICIDAL PROTEIN
L3             7 S PLATELET MICROBIAL PROTEIN
L4            57 S L1 (P) (L2 OR L3)
L5            18 DUPLICATE REMOVE L4 (39 DUPLICATES REMOVED)
L6          4935 S PMP
L7            12 S L6 (P) L1
L8             4 DUPLICATE REMOVE L7 (8 DUPLICATES REMOVED)
L9             0 S L8 NOT L5

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